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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/407,184	09/27/1999	FARSHAD KHORRAMI	457020-2250.	2412

20999 7590 11/19/2002

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745 FIFTH AVENUE- 10TH FL.
NEW YORK, NY 10151

EXAMINER

CONTEE, JOY KIMBERLY

ART UNIT	PAPER NUMBER
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2681

DATE MAILED: 11/19/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/407,184

Applicant(s)

Khorrami et al.

Examiner

Joy Contee

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on Sep 3, 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-11, 13-26, 28-37, 40-44, and 47-50 is/are pending in the application.
- 4a) Of the above, claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-11, 13-26, 28-37, 40-43, and 48-50 is/are allowed.
- 6) ☒ Claim(s) 44 and 47 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claims _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
*See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____ 6) ☐ Other:

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DETAILED ACTION

Terminal Disclaimer

1. The terminal disclaimer filed on 09/03/02 disclaiming the terminal portion of any patent granted on this application which would extend beyond the expiration date of U.S. Patent No. 5,970,393 has been reviewed and is accepted. The terminal disclaimer has been recorded.

Response to Amendment

2. The indicated allowability of the subject matter added to independent claim 44 is withdrawn in view of the newly discovered reference(s) to Ritter (U.S. Patent No. 5,859,873). Rejections based on the newly cited reference follow.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 44 and 47 are rejected under 35 U.S.C. 103(a) as being unpatentable over ~~XX~~, Ritter, U.S. Patent No. 5,859,873, in view of Spillman, Jr., U.S. Patent No. 5,440,300, previously used.

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Regarding claim 44, Ritter discloses an element for use in a system for monitoring (i.e., measuring unit contains a sensor 36) a structure (e.g., consumption data, temperature measurements, i.e., room temperature for controlling a heating system, see col. 1, lines 9-20) in a desired manner, said element being adaptable to be located on or within said structure and having at least one antenna and a rechargeable type storage device (col. 2, lines 11-22), in which energy is provided to said rechargeable type storage device from a signal transmitted to said antenna in a wireless manner for storage thereat (col. 66-67 to col. 3, lines 1-12).

Ritter fails to disclose additionally an element for use in a system for deforming said structure in a desired manner.

In a similar field of endeavor, Spillman, Jr. is evidence of smart structure having sensing means embedded in the body for receiving data and transmitting power (col. 1, lines 33-44 and col. 2, lines 52-67 to col. 3, lines 1-11).

At the time of the invention it would have been obvious to one of ordinary skill in the art to have modified the measuring unit in Ritter to include deforming or actuating a structure for the purpose of providing non-contact power and data interface as suggested in Spillman, Jr. (col. 2, lines 33-58).

Regarding claim 47, Ritter and Spillman, Jr. disclose the limitations of claim 44. Ritter further discloses the power for transmitting the measured data, which power the measuring unit receives from the base station maybe used in a generated DC Voltage, via a capacitor (col. 2, lines 33-37). Ritter also discloses a power source which is has small dimensions (col. 1, lines 60-64).

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Thus, at the time of the invention it would have been obvious to one of ordinary skill in the art that the capacitor in Ritter would have included a thin film battery for stored energy as suggested by the smart structure taught in Spillman, Jr. in that a modular construction maybe made of thin film electronics (col. 5, lines 1-16).

Allowable Subject Matter

5. Claims 1-11,13-26,28-37,40-43,48-50 are allowed.
6. The following is an examiner's statement of reasons for allowance:

Prior art of record fails to explicitly disclose a wireless communication system comprising: a number of sensors each having one or more antenna associated therewith and being adaptable to be located on or within an element, each sensor being adaptable to detect at least one respective predetermined characteristic of said element; and control transceiver means operable to communicate in a wireless manner with said number of sensors for supplying a RF signal to at least one antenna; whereby in response to said RF signal the respective sensor or sensors and the at least one antenna associated therewith generate by use of electromagnetic coupling therebetween a characteristic signal indicative of a detected respective characteristic or characteristics and modulate the same as to obtain an output signal and transmit said output signal.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue

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fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joy K. Contee whose telephone number is (703) 308-0149, M-F, 5:30 to 2:00 p.m.

If attempts to reach the examiner are not successful, the examiner's supervisor, Dwayne Bost can be reached on (703)305-4778.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703)306-0377.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D.C. 20231

or faxed to:


(703) 872-9314, (for formal communications intended for entry or for informal or draft communications, please label "PROPOSED" or "DRAFT")

Hand-delivered responses should be brought to

**Crystal Park II
Sixth Floor (Receptionist)
2121 Crystal Drive
Arlington, VA**


Joy K. Contee

November 15, 2002


**NAY MAUNG
PRIMARY EXAMINER**